

# INTERNATIONAL SEARCH REPORT

International Application No  
PCT/EP2004/052913

<b>A. CLASSIFICATION OF SUBJECT MATTER</b> IPC 7 G02B6/12 C03C3/04		
According to International Patent Classification (IPC) or to both national classification and IPC		
<b>B. FIELDS SEARCHED</b> Minimum documentation searched (classification system followed by classification symbols) IPC 7 G02B C03C		
Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched		
Electronic data base consulted during the international search (name of data base and, where practical, search terms used) EPO-Internal, PAJ, WPI Data, INSPEC, COMPENDEX		
<b>C. DOCUMENTS CONSIDERED TO BE RELEVANT</b>		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	WO 99/44937 A (BLOECHL PETER ; GERMANN ROLAND (CH); MASSAREK ILANA (CH); SALEMINK HUU) 10 September 1999 (1999-09-10) cited in the application abstract	1-17, 20-28, 47
Y		29, 30, 32-35, 37-46, 48-50, 52-56
A	page 8, line 15 - line 25 page 14, line 23 - page 15, line 16 page 15, line 24 - page 16, line 3 page 17, line 26 - line 28 ----- -/--	18, 19, 31
<input checked="" type="checkbox"/> Further documents are listed in the continuation of box C. <input checked="" type="checkbox"/> Patent family members are listed in annex.		
* Special categories of cited documents : "A" document defining the general state of the art which is not considered to be of particular relevance "E" earlier document but published on or after the international filing date "L" document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) "O" document referring to an oral disclosure, use, exhibition or other means "P" document published prior to the international filing date but later than the priority date claimed "T" later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art. "Z" document member of the same patent family		
Date of the actual completion of the international search 19 January 2005		Date of mailing of the international search report 28/02/2005
Name and mailing address of the ISA European Patent Office, P.B. 5818 Patentlaan 2 NL - 2280 HV Rijswijk Tel. (+31-70) 340-2040, Tx. 31 651 epo nl, Fax: (+31-70) 340-3016		Authorized officer Cohen, A

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C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT		
Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
Y	US 2002/154878 A1 (SIMPSON LYNN B ET AL) 24 October 2002 (2002-10-24)	29, 30, 32, 33, 37, 38, 42-46, 48-50, 52-56 36, 47, 51
A	abstract paragraphs '0010!, '0011!, '0040!, '0043! - '0047!, '0055!, '0056!, '0059! - '0061! table 2	
Y	PATENT ABSTRACTS OF JAPAN vol. 1997, no. 07, 31 July 1997 (1997-07-31) - & JP 09 080247 A (HITACHI CABLE LTD), 28 March 1997 (1997-03-28) abstract paragraphs '0010! - '0013!, '0016! - '0021!, '0027!; figure 1	34, 35, 39-41
A	US 6 408 125 B1 (BELLMAN ROBERT ALAN ET AL) 18 June 2002 (2002-06-18) abstract column 2, line 23 - column 3, line 3 column 3, line 37 - column 4, line 7 column 5, line 48 - column 6, line 5	1, 37, 53
A	PATENT ABSTRACTS OF JAPAN vol. 1999, no. 09, 30 July 1999 (1999-07-30) - & JP 11 109158 A (HITACHI CABLE LTD), 23 April 1999 (1999-04-23) abstract paragraph '0020!	1, 37, 53
A	CHELNOKOV A V ET AL: "Deep high-dose erbium implantation of low-loss silicon oxynitride waveguides" ELECTRONICS LETTERS, IEE STEVENAGE, GB, vol. 30, no. 22, 27 October 1994 (1994-10-27), pages 1850-1852, XP006001284 ISSN: 0013-5194 the whole document	27, 28
A	GERMANN R ET AL: "SILICON OXYNITRIDE LAYERS FOR OPTICAL WAVEGUIDE APPLICATIONS" JOURNAL OF THE ELECTROCHEMICAL SOCIETY, ELECTROCHEMICAL SOCIETY, MANCHESTER, NEW HAMPSHIRE, US, vol. 147, no. 6, June 2000 (2000-06), pages 2237-2241, XP009016715 ISSN: 0013-4651 cited in the application the whole document	47, 51

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PCT/EP2004/052913

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
WO 9944937	A	10-09-1999	EP 0983208 A1 WO 9944937 A1	08-03-2000 10-09-1999
US 2002154878	A1	24-10-2002	GB 2388110 A WO 02064523 A1	05-11-2003 22-08-2002
JP 09080247	A	28-03-1997	JP 3451809 B2	29-09-2003
US 6408125	B1	18-06-2002	AU 1432201 A CA 2391202 A1 EP 1232125 A1 JP 2003513875 T WO 0134530 A1 US 2002106174 A1	06-06-2001 17-05-2001 21-08-2002 15-04-2003 17-05-2001 08-08-2002
JP 11109158	A	23-04-1999	NONE	